

Your Gateway to
Cyber Security Career

Explore | Educate | Excel

EXECUTIVE PROGRAM IN
CYBER SECURITY

India's 1st Online Finishing School

JUx

JUx is an Online learning and engagement platform of Jain (Deemed-to-be University) offering industry relevant, in demand programs that enable learners to achieve their career goals. JUx offers you the opportunity to learn from industry pioneers, engage with best industry coaches and mentors who can enhance your career opportunities and make you future ready. We are committed to providing an exciting knowledge experience for every learner and aim to develop a community of learners who can develop their full potential for a promising career. The programs offered by JUx are the perfect blend of theoretical knowledge and practical skill that is in keeping with the current industry requirements.

Jain (Deemed-to-be University)

Ranked among the top universities in India and considered a cerebral destination for students across the world and Bangalore in particular, for its illustrious history of developing talent, Jain (Deemed-to-be University) is a hub for learning in every sense of the word.

The University which is based in Bangalore – the Silicon Valley of India, offers a conducive environment for learning, be it academically or extracurricular activities. Known for its emphasis on education, entrepreneurship, research and sports, Jain (Deemed-to-be University) has some of the best minds in the educational and research fields, and centers that inspire entrepreneurship and groundbreaking work to simplify and manage life better.

What makes Jain (Deemed-to-be University) different is its outlook towards life, its values and beliefs. Its ever-evolving and open-minded system and quest for continued success and resilience, has made it one of the top universities in India.

About the Program

The world relies on technology more than ever before. As a result, digital data creation and use has surged manifold. Today, businesses and governments store a great deal of data on computers and transmit it across networks to other computers. Traditionally cybersecurity is centred around the implementation of defensive measures around a defined perimeter to protect the data. This course showcases real life applications of Cyber Security (CyS). The program features hands-on assessments of cyber vulnerabilities, attacks, and defenses. Students will be able to devise actionable plans to address real-time CyS challenges. The program has been specifically designed with a strong emphasis on 'experiential learning' taught by industry experts catering to the needs of learners with different job roles across various industries for better career growth. The course is provided with Assignments, Case Studies and Projects for better understanding of the concepts.

Course Start Date: 18th June 2020

Duration of the Course: 6 Weeks

Class Schedule: 5.00 PM to 7.30 PM

on Tuesdays, Thursdays, Saturdays & Sundays

Mode of Delivery: Online Instructor Led

Key Highlights

- Get Certified from Jain (Deemed-to-be university)
- Curriculum designed by Academia & Industry
- Instructors from Jain (Deemed-to-be University) and Industry
- Master Classes – Well Crafted Webinars and Workshops delivered by Industry Experts
- Access to the latest tools and techniques along with their business applications
- Weekly Assignments for better understanding of concepts
- 30 Hours of Project Work
- Curated Mentorship
- 24*7 LMS Support
- Access to 30 Hours of Career Building Soft Skill Self-Paced Content
- Career Support – Webinars on Personality Development & 1:1 Career Counselling Sessions
- 100% Placement Assistance

Who can take this program?

- Graduates who want to start a career or entry level working professionals who want to upskill and add to their expertise can join this course.
- Working Professional (upto 2 years of work experience)
- Students Pursuing Graduation and Post Graduation

Curriculum

Defensive Network Security

- Introduction to Network Security
- Design and configuration of various enterprise infrastructure
- Defending network from attacks
- Security benchmarks and regulatory requirements
- Device and network-based attacks.
- Firewall and IDS configuration
- Securing Windows and Active Directory against specific attacks.
- Incidence response and security analytics.
- Overview of securing Private and Public Cloud Infrastructure against common attacks.
- Case study - Study a recent network breach to identify attack vector and network vulnerabilities
- Project – Configure and secure network infrastructure using network simulation tools.

Penetration Testing/Ethical Hacking

- Introduction to Penetration Testing Concepts
- Penetration Testing Scoping and Rules of Engagement
- Online Reconnaissance and Offensive Counterintelligence
- Network Mapping and Scanning Techniques
- Enterprise Vulnerability Scanning
- Network Exploitation Tools and Techniques
- Web Application Exploitation Tools and Techniques
- Post-Exploitation and Pivoting
- OS and Application Exploit Mitigations
- Reporting and Debriefing
- Social Engineering
- Case study – Understand a recent hacking/attack scenario
- Project – Given a website/web application, exercise the stages of penetration testing to find vulnerabilities with it.

Cyber Forensics

- Digital Forensics methodology and Fundamentals
- Chain of custody and Forensics report writing
- Introduction to Incident response digital forensics
- Network/Internet forensic and anti-forensics
- Windows/Linux forensics analysis
- Windows registry investigation steps and technologies
- Malware and Cloud forensics
- Advanced artefacts - Loadable kernel module rootkits Steganography hiding, detection and analysis
- Case study – Forensic analysis of a recent cybercrime investigation and understand the methodology.
- Project – forensic investigation on an image capture, malware or packet capture and come up with evidence

Course Outcome

Upon completion of the course students will be able to

- Impart the required knowledge that ensures understanding of fundamental concepts, design and controls strategy, technical architecture, tools and techniques to secure information.
- Use both application-oriented and student-centric learning to help expand students' body of knowledge in information protection.
- Emphasize the importance of adherence to a high standard of ethical behavior.
- Provide a platform for students to not only familiarize themselves in CyS concepts and technologies but also an opportunity to learn some advances in this important area of study.
- Create a learning environment that stimulates interest in considering entrepreneurial Avenues.

Tools

Metasploit, SNORT, SPLUNK, Nmap, Cisco packet tracer, FTK imager, Hashing and recovery tools, Windows/Linux forensics tools – Cyber check suite, FRAT, Autopsy, Volatility, Wireshark, Network miner etc.

Orientation and Batch start Date:

- Online Instructor Led
- Orientation 16th JUNE 2020
- Batch start Date 18th JUNE 2020

Job prospects

Security Analyst

Security Administrator

Security Consultant

Network Security Engineer

Professional Hacker